

RAW SEQUENCE LISTING  
PATENT APPLICATION: US/09/557,262  
DATE: 05/19/2009  
TIME: 16:30:03

Input Set : A:\MIT087PC.txt  
Output Set : N:\CRF3\05092000\I557262.raw

ENTERED

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1 110- APPLICATION: ROSENBERG, RUTH D.
2 100- SUBJECT: Nucleic acid
3 100- JIN, JIN
4 100- PRIMER: LINE 100
5 100- SCHWAPIN, JIN
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100 100- JIN, JIN

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## RAW SEQUENCE LISTING

PATENT APPLICATION US/09/557,262

DATE: 04/10/2000

TIME: 16:10:03

Input Set: A:\MIT087PC.txt

Output Set: N:\CRF3\05092000\1557262.raw

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10 cta gag ata ctc acc ctg cat cct gat att gct gca gct gaa acc gag      782
11 leu glu met leu ser leu his pro asp val ala ala ala glu asn glu
12 80 50 98
13 gtc cat ttc ttt gac tgg gag gac cat tac acc aa gc ctg ggc taa      810
14 val his phe phe asp tip glu leu s pro ser thr gl leu gly trp
15 95 103
16 tac ttc acc cta att cct ttt ttt ttt ttt ttt ttt ttt ttt ttt ttt ttt      818
17 tyr leu thr glu met asp leu leu leu leu leu leu leu leu leu leu leu
18 110 118
19 aaa aaa ccc ggc tat ttc att ttt ccc aaa atg cct aat aat aat aat      826
20 lys thr pro ala tyr phe thr ser pro leu val pro glu arg leu his
21 125 133
22 ggc att tac acc ttc att ctg ttt ttt ttt ttt ttt ttt ttt ttt ttt ttt      834
23 ser thr asn pro thr ile asp leu leu leu leu leu leu leu leu leu leu
24 140 148
25 gag cgc atg ata ttt ggc ttt ttt ttt ttt ttt ttt ttt ttt ttt ttt ttt      842
26 glu arg val leu ser asp thr thr val leu leu leu leu leu leu leu leu
27 155 163
28 aag cag aag ccc tat cca cct ttt ttt ttt ttt ttt ttt ttt ttt ttt ttt      850
29 lys his lys pro tyr thr thr thr thr thr thr thr thr thr thr thr thr
30 170 178
31 cgg cta acc ctg gac tac aaa att ttt ttt ttt ttt ttt ttt ttt ttt ttt ttt      858
32 arg leu asn leu asp tyr leu leu leu leu leu leu leu leu leu leu leu
33 185 193
34 cac atg cta aac tgg ctg cat ttt ttt ttt ttt ttt ttt ttt ttt ttt ttt      866
35 his met leu asn tip leu s thr phe thr leu thr his thr his thr
36 200 208
37 ata gat ttc gac cgc ctc ttt ttt ttt ttt ttt ttt ttt ttt ttt ttt ttt      874
38 val asp gly asp arg leu thr thr tip thr thr thr thr thr thr thr thr thr
39 215 223
40 gtc gca aga ttc ctg gag ttt ttt ttt ttt ttt ttt ttt ttt ttt ttt ttt      882
41 val gl arg phe leu lys leu ser pro gl thr asn ala ser asn phe
42 230 238
43 ttc ttt aac aaa aac aag ggc ttc tac tgc ctg cgg ttc aat ggc aac      890
44 tyr phe asn lys thr lys gly phe tyr cys leu arg asp ser gl lys
45 245 253
46 gag cgc tgc tta ca gac ttt ttt ttt ttt ttt ttt ttt ttt ttt ttt ttt      898
47 asp arg c leu his glu leu leu leu leu leu leu leu leu leu leu leu
48 260 268
49 ccc aia ctt att aat aaa ctt ttt ttt ttt ttt ttt ttt ttt ttt ttt ttt      906
50 pro lys leu leu asp lys leu leu leu leu leu leu leu leu leu leu leu
51 275 283
52 aaa ttt ttc aag ctc ata ggc ttt ttt ttt ttt ttt ttt ttt ttt ttt ttt      914
53 lys phe phe lys leu val glu arg thr phe arg thr thr thr thr thr thr
54 290 300
55 tctcttggc tccggacttt tctatttatt aucttctgat gtatatctta aggggggaag      922
56 aaataatttt taaaaagaaa ttttaactat aatttatitfa taaaacccac aactgaattc      930
57 tatcagttat tatattcaca attgccatat atagtagtta tatttttcta ctgttttaaa      938
58 ggagggcatt ttgtatttatt tttctatdatt attaacattg tgtatagtc tatataatat      946

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RAW SEQUENCE LISTING  
 PATENT APPLICATION US/09/557,262

DATE: 05/19/2009  
 TIME: 10:20:13

Input Set: A:\MIT087PC.txt  
 Output Set: N:\CRF3\05092009\I557262.raw

```

148 gaagaaatt aactattaa ctgaadaaat aacgaattt ttttttgg agaatcttt tccg
149 ttttttgtt attattttt atataattt actatcttca atctatata gctcttttt tctg
150 tt aactctt tctcaattt atagctttt tctgctttn aaattttt gtaatttga tgc
151 <210> SEQ ID NO: 2
152 <211> LENGTH: 311
153 <212> TYPE: CDS
154 <213> ORGANISM: Homo sapiens
155 <155> SEQUENCE: 2
156 Met Thr Leu Leu Leu Leu Glu Ala Val Leu Leu Val Ala Glu Leu Glu
157 Val Val His Ser His Pro Ala Ala Arg Glu Leu Leu Leu Leu Glu
158 Glu Leu Leu Arg Lys Val Ala Leu Leu Pro Glu Asp Leu Lys Glu
159 Thr Ala Ser Asn Glu Leu Leu Leu Leu Leu Leu Leu Leu Leu
160 Gly Val Arg Lys Cys Leu Leu Leu Leu Leu Leu Leu Leu Leu
161 His Pro Asp Val Ala Leu Leu Leu Leu Leu Leu Leu Leu Leu
162 Glu Glu His Tyr Ser Leu Leu Leu Leu Leu Leu Leu Leu Leu
163 Phe Ser Ser Pro His Leu Leu Leu Leu Leu Leu Leu Leu Leu
164 Thr Ser Pro Leu Val Leu Leu Leu Leu Leu Leu Leu Leu Leu
165 Ala Leu Leu Leu Leu Leu Leu Leu Leu Leu Leu Leu Leu Leu
166 Tyr Thr Glu Val Leu Leu Leu Leu Leu Leu Leu Leu Leu Leu
167 Pro Ile Glu Asp Leu Leu Leu Leu Leu Leu Leu Leu Leu Leu
168 Lys Ala Leu Asn Arg Ser Leu Leu His Ala His Met Leu Asn Trp Leu
169 Arg Phe Leu Pro Leu Gly His Ile His Ile Val Asp Gly Asp Ala Leu
170 Ile Arg Asp Pro Leu Leu Glu Leu Leu Leu Leu Leu Leu Leu Leu
171 Leu Ser Pro Glu Leu Leu Leu Leu Leu Leu Leu Leu Leu Leu
172 Gly Phe Tyr Cys Leu Leu Leu Leu Leu Leu Leu Leu Leu Leu
173 Ser Lys Gly Arg Ala Leu Leu Leu Leu Leu Leu Leu Leu Leu Leu
174 Leu His Glu Tyr Phe His Glu Pro Leu Lys Lys Phe Phe Leu Leu Val
175 Gly Arg Thr Phe Asp Trp His
176 <210> SEQ ID NO: 3

```

## RAW SEQUENCE LISTING

PATENT APPLICATION US/09/557,262

DATE: 05/10/2000

TIME. 40:30.03

Input Set : A:\MIT087PC.txt

Output Set: N:\CRF3\05092000\1557262.raw

213	211	LENGTH: 1305	
214	212	TYPE: DNA	
215	213	ORGANISM: Homo sapiens	
217	220	FEATURE:	
218	221	NAME/KEY: CDS	
219	222	LOCATION: (118)...(1305)	
220	223	OTHER INFORMATION: Intron 5'-5'UTR	
222	100	SEQUENCE: 3	
223	60	cgagcgctgac taaatgaagg cctaaacagg cctatgga ttaactaa aaacttcgtg	60
224	60	cctccgaact taatgaacca caatgaagc cca gaacatcaa accacacata tatcaaac	120
225	60	atg aac gaa ctc tcc cta gaa gaa gta cta cta atg acc caa acc cag	180
226	60	58 Met Ala Ala Leu Leu Leu Val Val Val Val Val Ala Glu Lys Glu	
227	60	1 2 3 4 5 6 7 8 9 10 11 12	
228	60	ctt cta gtc cct tcc cct cct cct cct cct cct cct cct cct cct cct	240
229	60	131 Ile Val Pro Ser Ala Pro Ser Ser Ser Ser Ser Ser Ser Ser Ser	
230	60	13 14 15 16 17 18 19 20 21 22 23 24 25 26	
231	60	aaa gaa gaa gaa acc ctc ctc ctc ctc ctc ctc ctc ctc ctc ctc	300
232	60	37 Lys Ala Gly Thr Thr Thr Thr Thr Thr Thr Thr Thr Thr Thr Thr	
233	60	27 28 29 30 31 32 33 34 35 36 37 38 39 40	
234	60	gaa tct aac caa ctc ctc ctc ctc ctc ctc ctc ctc ctc ctc ctc	360
235	60	41 Gly Ser Ala Glu Thr Thr Thr Thr Thr Thr Thr Thr Thr Thr Thr	
236	60	43 44 45 46 47 48 49 50 51 52 53 54 55 56	
237	60	aac aac aag ccc aac ctc ctc ctc ctc ctc ctc ctc ctc ctc ctc	420
238	60	57 Gly Tyr Thr Arg Ala Leu Thr Thr Thr Thr Thr Thr Thr Thr Thr	
239	60	59 60 61 62 63 64 65 66 67 68 69 70 71 72	
240	60	gaa gaa gaa gaa gaa gaa gaa gaa gaa gaa gaa gaa gaa gaa gaa	480
241	60	73 Ala Ala Ala Glu Ala Thr Val Thr Thr Thr Thr Thr Thr Thr Thr	
242	60	75 76 77 78 79 80 81 82 83 84 85 86 87 88	
243	60	aac aac gtc ttc ctc ctc ctc ctc ctc ctc ctc ctc ctc ctc ctc	540
244	60	89 Ser His Thr Leu Val Thr Thr Thr Thr Thr Thr Thr Thr Thr Thr	
245	60	91 92 93 94 95 96 97 98 99 100 101 102 103 104	
246	60	cac gaa ctc a a a gta gaa aag a a a a a a a a a a a a a a a a	600
247	60	105 His Glu Leu Thr Val Glu Lys Thr Thr Thr Thr Thr Thr Thr Thr	
248	60	107 108 109 110 111 112 113 114 115 116 117 118 119 120	
249	60	gta cct aag ggt ctc tac aag gta a a a a a a a a a a a a a a a	660
250	60	121 Pro Thr Arg Val Tyr Thr Met Thr Thr Thr Thr Thr Thr Thr Thr	
251	60	123 124 125 126 127 128 129 130 131 132 133 134 135 136	
252	60	aac aag cga aac aca tca a a a a a a a a a a a a a a a a a a	720
253	60	137 Ile Leu Arg Asp Pro Ser Thr Thr Thr Thr Thr Thr Thr Thr Thr	
254	60	139 140 141 142 143 144 145 146 147 148 149 150 151 152	
255	60	ttc tac aac aac atg a a a a a a a a a a a a a a a a a a	780
256	60	153 Phe Tyr Asp His Met Cys Thr Thr Thr Thr Thr Thr Thr Thr Thr	
257	60	155 156 157 158 159 160 161 162 163 164 165 166 167 168	
258	60	ttc cta gta cgc gat aac aac aac aac aac aac aac aac aac aac	840
259	60	169 Thr Val Val Arg Asp Gly Arg Leu Ala Val Asp Tyr Lys Val Leu Thr	
260	60	171 172 173 174 175 176 177 178 179 180 181 182 183 184	
261	60	cgc aac ctc tac aac gta ttc atg aac aac aac aac aac aac aac	900
262	60	185 Arg Ser Leu Tyr His Val His Met Glu Asn Thr Leu Arg Phe Phe Pro	
263	60	187 188 189 190 191 192 193 194 195 196 197 198 199 200	



## VERIFICATION SUMMARY

PATENT APPLICATION US/09/357,262

DATE: 09/18/2000

TIME: 16:13:41

Input Set: A:\MIT087PC.txt

Output Set: N:\CRF3\05092000\I557262.raw

1.1.1 Mj087PC: Current Application Number differs. Replaced Application Number  
1.1.1 Mj087PC: Current Filing Date differs. Replaced Current Filing Date